To: Chairman Andrew Zwicker and Members of the Assembly Science, Innovation and Technology Committee

From: Nicole Sandelier – Policy Analyst

Date: January 24, 2019

RE: NJBIA’s *Indicators of Innovation* report

On behalf of our member companies that provide more than 1 million jobs in the state and make the New Jersey Business & Industry Association the largest statewide business association in the country, we appreciate the opportunity to submit testimony in regards to New Jersey’s current innovation ecosystem and its impact on business.

It is the vision of NJBIA that New Jersey will reclaim its stature as the innovation state. We have seen a renewed commitment from Governor Murphy and members of the Legislature to have this important discussion. As such, earlier this month NJBIA released a report titled Indicators of Innovation, which shows New Jersey at a challenging crossroads in its efforts to reclaim itself as the “Innovation State.”

The study used data to analyze 12 indicators of innovation under three major categories imperative for creating a successful innovation ecosystem – capital, talent and business. Compared with six other regional states, however, New Jersey is struggling to compete, the report found. Some major findings also include:

- New Jersey’s venture capital investment in 2017 was $781 million, compared to the $8.97 billion received by Massachusetts and $12.27 billion received by New York.
- New Jersey increased its venture capital investment at a lower rate than all seven states in the region between 2004 and 2017.
- New Jersey companies received less than $52 million in award obligation for federal R&D funding efforts in 2017, compared to nearly $271 million awarded to Massachusetts. The state also received less award funding than Maryland ($124 million), New York ($114 million) and Pennsylvania ($98 million).
- In 2018, New Jersey received $157 million in National Science Foundation College/University funding – significantly less than regional competitors New York ($466 million), Massachusetts ($415 million) and Pennsylvania ($253 million).
- New Jersey is home to three "Top 100" colleges/universities ranked in 2018 by *U.S. News & World Report*, compared to 10 each in Massachusetts and New York; and six in Pennsylvania.
- New Jersey lost a net total of more than 28,000 first-time college students in the fall of 2016, the largest loss in the nation. By regional comparison, Pennsylvania had a net gain of nearly 17,000 students that year.
- In 2017, New Jersey was fifth out of seven states with 15.6 percent of its population possessing a graduate or professional degree. By comparison, Massachusetts’ graduate and professional degree holders represented 19.5 percent of its population.
New Jersey does fare well regionally in its Rate of New Entrepreneurs, with 340 adults starting a business for every 100,000 people in the state in 2017. That's second in the region behind New York, which had 360 business starters per 100,000 adults that same year.

New Jersey's startup density was 76.1 per 1,000 employer firms in 2017, good for third in the region behind New York (83.3 per 1,000 firms) and Delaware (77 per 1,000 firms).

In 2017, New Jersey ranked fourth in the region with more than 8,600 patents issued. Massachusetts (more than 15,000 patents issued) and New York (nearly 14,700 patents issued) held a decided advantage.

From 2015 to 2016, New Jersey experienced a 0.44 percent increase in total businesses – which is sixth in the region. Delaware enjoyed a 2.03 percent increase in total businesses during that span.

New Jersey finished last out of seven regional states in NJBIA's 2018 Regional Business Climate analysis, which scores metrics such as each state's minimum wage, top income tax rate, top corporate tax rate, sales tax rate, property tax paid as a percentage of home value, and unemployment tax rate.

In NJBIA’s *Indicators of Innovation* report, each indicator was scored from 1 (least competitive in the region) to 7 (most competitive), with a potential high score of 84. New Jersey ranked fifth out of the seven states with a cumulative innovation score of 41.

New York ranked first in the region with a score of 71, followed by Massachusetts (63), Pennsylvania (49), Maryland (46), New Jersey (41), Delaware (34) and Connecticut (33).

In addition to the 12 indicators analyzed in the report, NJBIA also observed additional factors in a New Jersey-Massachusetts comparison that can help jump-start and sustain an innovation ecosystem. Further, using a case study detailing how Audible Inc.’s role as a committed partner in the revitalization of Newark can fuel “community visioning” and the leveraging of community assets, the report notes best practices for business engagement.

Based on the findings from the report, NJBIA is setting forth the following recommendations:

- Increase thresholds for those investing in R&D and small emerging technology businesses, specifically the Research and Development Tax Credit and the Angel Investor Tax Credit;
- Support New Jersey colleges/universities to drive increased federal R&D funding to their institutions;
- Increase incubators and accelerator presence at/near our research institutions;
- Support and assist the President’s Council and their Marketing Committee;
- Analyze the impact a policy will have on New Jersey’s overall regional business climate prior to implementation;
- Reactivate the essence of the Red Tape Review Commission.

NJBIA is committed to recreating a thriving innovation ecosystem here in New Jersey. We thank you for the opportunity to submit testimony and for your consideration of our views. Should you have any questions or need further information, please feel free to contact me at 609-858-9513.